



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/980,046	05/28/2002	Adel Youakim	216019-33	8000
7590 04/21/2004				
EXAMINER				
SAIDHA, TEKCHAND				
ART UNIT		PAPER NUMBER		
1652				

DATE MAILED: 04/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 09/980,046	<b>Applicant(s)</b> YOUAKIM ET AL.	
	<b>Examiner</b> Tekchand Saidha	<b>Art Unit</b> 1652	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 29 September 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-32 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) \_\_\_\_\_ is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☒ Claim(s) 1-32 are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

***Election/Restrictions***

Restriction is required under 35 U.S.C. 121 and 372.

This application contains the following inventions or groups of inventions which are not so linked as to form a single general inventive concept under PCT Rule 13.1.

In accordance with 37 CFR 1.499, applicant is required, in reply to this action, to elect a single invention to which the claims must be restricted.

**DNA**

Group I, claim(s) 1, 3-7, 9-14, 19-20 & 25, drawn to nucleic acid molecules of SEQ ID NO : 1-10, vector, host cell and method of making the polypeptides.

Group II, claim(s) 1, 3-7, 9-14, 19-20 & 25, drawn to nucleic acid molecules of SEQ ID NO : 11-20, vector, host cell and method of making the polypeptides.

Group III, claim(s) 1, 3-7, 9-14, 19-20 & 25, drawn to nucleic acid molecules of SEQ ID NO : 21-30, vector, host cell and method of making the polypeptides.

Group IV, claim(s) 1, 3-7, 9-14, 19-20 & 25, drawn to nucleic acid molecules of SEQ ID NO : 31-40, vector, host cell and method of making the polypeptides.

Group V, claim(s) 1, 3-7, 9-14, 19-20 & 25, drawn to nucleic acid molecules of SEQ ID NO : 41-43, vector, host cell and method of making the polypeptides.

**Polypeptide**

Group VI, claim(s) 2, 8 & 15, drawn to polypeptide encoded by the nucleic acid molecules of SEQ ID NO :1-10.

Group VII, claim(s) 2, 8 & 15, drawn to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 11-20.

Group VIII, claim(s) 2, 8 & 15, drawn to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 21-30.

Group IX, claim(s) 2, 8 & 15, drawn to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 31-40.

Art Unit: 1652

Group X, claim(s) 2, 8 & 15, drawn to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 41-43.

### **Antibody**

Group XI, claim(s) 16-18, 28-31, drawn to antibody to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 1-10.

Group XII, claim(s) 16-18, 28-31, drawn to antibody to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 11-20.

Group XIII, claim(s) 16-18, 28-31, drawn to antibody to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 21-30.

Group XIV, claim(s) 16-18, 28-31, drawn to antibody to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 31-40.

Group XV, claim(s) 16-18, 28-31, drawn to antibody to polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 41-43.

### **Method of preventing, treating.. using polypeptide.**

Group XVI, claim(s) 21, drawn to method of preventing, treating, etc., using the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 1-10.

Group XVII, claim(s) 21, drawn to method of preventing, treating, etc., using the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 11-20.

Group XVIII, claim(s) 21, drawn to method of preventing, treating, etc., using the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 21-30.

Group XIX, claim(s) 21, drawn to method of preventing, treating, etc., using the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 31-40.

Group XX, claim(s) 21, drawn to method of preventing, treating, etc., using the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 41-43.

### **Method of diagnosing a pathological condition using mutation in the DNA**

Group XXI, claim(s) 22-23 & 32, drawn to method of diagnosing using a mutation in the nucleic acid molecules of SEQ ID NO : 1-10.

Group XXII, claim(s) 22-23 & 32, drawn to method of diagnosing using a mutation in the nucleic acid molecules of SEQ ID NO : 11-20 .

Art Unit: 1652

Group XXIII, claim(s) 22-23 & 32, drawn to method of diagnosing using a mutation in the nucleic acid molecules of SEQ ID NO : 21-30.

Group XXIV, claim(s) 22-23 & 32, drawn to method of diagnosing using a mutation in the nucleic acid molecules of SEQ ID NO : 31-40.

Group XXV, claim(s) 22-23 & 32, drawn to method of diagnosing using a mutation in the nucleic acid molecules of SEQ ID NO : 41-43.

**Method of identifying a binding partner to the polypeptide**

Group XXVI, claim(s) 24, drawn to method of identifying a binding partner to the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 1-10.

Group XXVII, claim(s) 24, drawn to method of identifying a binding partner to the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 11-20.

Group XXVIII, claim(s) 24, drawn to method of identifying a binding partner to the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 21-30.

Group XXIX, claim(s) 24, drawn to method of identifying a binding partner to the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 31-40.

Group XXX, claim(s) 24, drawn to method of identifying a binding partner to the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 41-43.

**Method of identifying an activity of the expressed polypeptide**

Group XXXI, claim(s) 26, drawn to method of identifying a activity of the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 1-10, in a biological assay.

Group XXXII, claim(s) 26, drawn to method of identifying a activity of the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 11-20, in a biological assay.

Group XXXIII, claim(s) 26, drawn to method of identifying a activity of the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 21-30, in a biological assay.

Group XXXIV, claim(s) 26, drawn to method of identifying a activity of the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 31-40, in a biological assay.

Group XXXV, claim(s) 26, drawn to method of identifying a activity of the polypeptide encoded by the nucleic acid molecules of SEQ ID NO : 41-43, in a biological assay.

**DNA probes**

Group XXXVI, claim(s) 27, drawn to an isolated DNA molecule identified in Table 1, having a 5' partial nucleotide sequence 1 of 79 sequences (or digital addresses).

Group XXXVII, claim(s) 27, drawn to an isolated DNA molecule identified in Table 1, having a 5' partial nucleotide sequence 2 of 79 sequences (or digital addresses).

.....

Group CXIV (or Group 114), claim 27, drawn to an isolated DNA molecule identified in Table 1, having a 5' partial nucleotide sequence 79 of 79 sequences (or digital addresses).

The inventions listed as Groups I-CXIV (Groups 1-114) do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons: Groups 1 and each of the groups of the DNA (groups 2-5) have a special technical feature of the nucleotide sequence encoding a distinct polypeptide, which groups 6-114 do not share; Groups 6-10 have a special technical feature of a polypeptide sequence which groups 1-5 and 11-114 do not share; Each of the Groups 11-15, similarly, have a special technical feature of an antibody, which groups 1-10 and 16-114 do not share; Similarly, each of the method groups 16-114 have a distinct special technical feature which groups 1-15 do not share. As explained, during the PCT search for PCT/US00/15191, and as per commissioner decision – sue sponte to partially waive 37 CFR 1.475 and 1.499 et seq. to permit applicants to claim upto ten (10) sequences which do not have the same or corresponding special technical feature.

Applicant is advised that the reply to this requirement to be complete must include an election of the invention to be examined even though the requirement be traversed (37 CFR 1.143).

Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

Art Unit: 1652

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tekchand Saidha whose telephone number is (571) 272 0940. The examiner can normally be reached on 8.30 am - 5.00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ponnathapu Achutamurthy can be reached on (571) 272 0928. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Tekchand Saidha  
Primary Examiner, Art Unit 1652  
Recombinant Enzymes, E03A61 Remsen Bld.  
400 Dulany Street, Alexandria, VA  
Telephone : (571) 272-0940

April 16, 2004